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LEXMARK INTERNATIONAL, INC.
INTELLECTUAL PROPERTY LAW DEPARTMENT
740 WEST NEW CIRCLE ROAD
BLDG. 082-1
LEXINGTON, KY 40550-0999

EXAMINER	
KASSA, HILINA S	

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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	10/619,239	EDWARDS, MARK JOSEPH	
	Examiner	Art Unit	
	Hilina S. Kassa	2625	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *07/14/2003*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *39-47* is/are pending in the application.

4a) Of the above claim(s) *1-36 and 48-69* is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *39-47* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *14 July 2003* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date *07/14/03 and 06/01/04*.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

1. The election/restriction made on 06/04/07 for claims 39-47 has been acknowledged.

Claim Rejections - 35 USC § 102

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (a) the invention was known or used by others in this country, or patented or described in a printed publication in this or a foreign country, before the invention thereof by the applicant for a patent.

3. Claim 39 is rejected under 35 U.S.C. 102(a) as being anticipated by Norris et al. (US Publication Number 2003/0072013).

(1) regarding claim 39:

As shown in figure1 Norris et al. disclose, a sound recording (4, figure 1) and image forming system (6, figure 1), comprising:

a memory circuit for storage of data (20, figure 1); a print engine (6, figure 1); a microphone (28, figure 1); an interface circuit (22, figure 1); and at least one processing circuit that is configured to control a flow of data: (a) from said interface circuit (10, figure 1), and (b) between said print engine and said memory circuit (36, figure 1); wherein:

said microphone generates an audio frequency signal from received sound waves (paragraph 13, lines 3-5; note that the microphone generate an analog audio data signal i.e. frequency signal in response to the sensed audio data);

said interface circuit receives and converts said audio-frequency signal generated by said microphone into a first data signal (paragraph 13, lines 5-8; note that the A/D converter converts the analog audio data signal into captured audio data which is considered as the first data signal), wherein at least a portion of said first data signal comprises information representative of said received sound waves (paragraph 13, lines 5-8; note that the portion of the captured audio data i.e. the first data signal is from the received digitized analog signal); and

said at least one processing circuit is further configured: (c) to receive said first data signal from said interface circuit (paragraph 14, lines 1-3), (d) to convert said first data signal into a second data signal comprising a print job (paragraph 14, lines 1-6), and (e) to transfer said second data signal to said print engine for recording as a hard-copy printout upon a print media (paragraph 38, lines 1-4), in which at least a portion of said hard-copy printout is representative of said received sound waves (paragraph 37, lines 1-9; note that the audio data is extracted to the print command).

Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the

invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

5. Claims 40-44 and 46-47 are rejected under 35 U.S.C. 103(a) as being unpatentable over Norris et al. (US Publication Number 2003/0072013 A1) as applied to claim 39 above, and further in view of Morohashi et al. (US Patent Number 6,043,899).

(1) regarding claim 40:

Norris et al. disclose all of the subject matter except for teaching wherein said microphone and said interface circuit are one of: (a) resident on a computer device that is physically separate from said print engine; and (b) resident on an image forming apparatus which also incorporates said print engine.

However, Morohashi et al. teach wherein said microphone and said interface circuit are resident on an image forming apparatus which also incorporates said print engine (2, 20, 24, 31, figure 2; column 6, lines 25-32, lines 42-43; note that the code pattern image recording apparatus incorporates the print unit, microphone and analog/digital interface).

Norris et al. and Morohashi et al. are combinable because they are from the same field of endeavor.

At the time of the invention, it would have been obvious to a person of ordinary skill in the art to have an image forming apparatus that include microphone, interface circuit and print engine because such system is efficient enough to have higher information transfer rate.

The suggestion/motivation for doing so would have been to make the system efficient and versatile.

Therefore, it would have been obvious to combine Norris et al. with Morohashi et al. to obtain the invention as specified in claim 40.

(2) regarding claim 41:

Norris et al. disclose all of the subject matter except for teaching wherein said system provides an automatic record mode that records said received sound waves and automatically creates said hard-copy printout, said mode commencing upon a first manual action performed by a user and terminating upon one of the following events:

(a) after a first predetermined period of time, as selectable in advance by said user;

(b) after a second predetermined period of time, as automatically determined by an amount of physical space that remains available upon a sheet of print media;

(c) upon a second manual action by said user; and

(d) upon a lack of received sound waves of a predetermined minimum audio level for a third predetermined time period.

However, Morohashi et al. teach wherein said system provides an automatic record mode that records said received sound waves and automatically creates said hard-copy printout (column 2, line 60-column 3, line 2), said mode commencing upon a first manual action performed by a user and terminating upon after a second predetermined period of time (column 5, line 66-column 6, line 15), as automatically

determined by an amount of physical space that remains available upon a sheet of print media (column 8, line 66-column 9, line 2).

Norris et al. and Morohashi et al. are combinable because they are from the same field of endeavor.

At the time of the invention, it would have been obvious to a person of ordinary skill in the art to have a system that provides an automatic record mode that records said received sound waves and automatically creates said hard-copy printout and the mode starting when it is set up by user and ends if it runs out of print medium.

The suggestion/motivation for doing so would have been for efficiency (column 2, lines 31-37).

Therefore, it would have been obvious to combine Norris et al. with Morohashi et al. to obtain the invention as specified in claim 41.

(3) regarding claim 42:

Norris et al. disclose all of the subject matter as described above except for teaching wherein said second predetermined period of time is graphically displayed in a graphic preview mode of operation.

However, Morohashi et al. teach wherein said second predetermined period of time is graphically displayed in a graphic preview mode of operation (column 5, lines 46-49; line 66-column 6, line 4).

Norris et al. and Morohashi et al. are combinable because they are from the same field of endeavor.

At the time of the invention, it would have been obvious to a person of ordinary skill in the art to have second predetermined period of time that is displayed graphically.

The suggestion/motivation for doing so would have been to advance the accuracy of the system.

Therefore, it would have been obvious to combine Norris et al. with Morohashi et al. to obtain the invention as specified in claim 42.

(4) regarding claim 43:

Norris et al. disclose all of the subject matter as described as above except for teaching wherein said system stores one of said first data signal and said second data signal as a file in one of: (a) said memory circuit; (b) a first bulk memory device that is resident on an image forming apparatus that also contains said print engine; and (c) a second bulk memory device that is resident on an external computer.

However, Morohashi et al. teach wherein said system stored one of said first data signal and said second data signals as a file in memory circuit (26, figure 2; column 6, lines 33-38).

Norris et al. and Morohashi et al. are combinable because they are from the same field of endeavor.

At the time of the invention, it would have been obvious to a person of ordinary skill in the art to have a memory in order to store one of said first data signal and said second data signals.

The suggestion/motivation for doing so would have been for reliability.

Therefore, it would have been obvious to combine Norris et al. with Morohashi et al. to obtain the invention as specified in claim 43.

(5) regarding claim 44:

Norris et al. disclose all of the subject matter as described as above except for teaching wherein said file comprises one of: (a) uncompressed data; (b) lossless compressed data; (c) lossy compressed data; (c) a WAV file, and (d) an MP3 file.

However, Morohasi et al. teach wherein said file comprises lossless compressed data (column 6, line 65-column 7, line 8; note that the audio compression used in this system gets expanded or reconstructed as desired 41, figure 2).

Norris et al. and Morohashi et al. are combinable because they are from the same field of endeavor.

At the time of the invention, it would have been obvious to a person of ordinary skill in the art to have a data compression method that could be reconstructed as desired.

The suggestion/motivation for doing so would have been to advance the system's efficiency by reconstructing the data as needed.

Therefore, it would have been obvious to combine Norris et al. with Morohashi et al. to obtain the invention as specified in claim 44.

(6) regarding claim 46:

Norris et al. disclose all of the subject matter as described as above except for teaching wherein said at least one processing circuit is further configured: (f) to receive an additional audio-frequency signal from said microphone; (g) to convert said additional audio-frequency signal and to automatically append said additional audio-frequency signal as a further portion of said second data signal; and (h) to record said further portion of said second data signal as part of said hard-copy printout.

However, Morohasi et al. teach wherein said at least one processing circuit is further configured: (f) to receive an additional audio-frequency signal from said microphone (column 6, lines 25-29); (g) to convert said additional audio-frequency signal and to automatically append said additional audio-frequency signal as a further portion of said second data signal (column 6, lines 29-37); and (h) to record said further portion of said second data signal as part of said hard-copy printout (column 6, line 65-column 7, 8).

Norris et al. and Morohashi et al. are combinable because they are from the same field of endeavor.

At the time of the invention, it would have been obvious to a person of ordinary skill in the art to receive an additional audio-frequency signal from said microphone; to convert said additional audio-frequency signal and to automatically append said additional audio-frequency signal as a further portion of said second data signal; and to record said further portion of said second data signal as part of said hard-copy printout.

The suggestion/motivation for doing so would have been to have an efficient and versatile system.

Therefore, it would have been obvious to combine Norris et al. with Morohashi et al. to obtain the invention as specified in claim 46.

(7) regarding claim 47:

Norris et al. disclose all of the subject matter as described above except for teaching wherein a maximum amount of remaining recording time is graphically displayed in a graphic preview mode of operation, based upon an amount of physical space that remains available upon said hard-copy printout.

However, Morohashi et al. teach wherein a maximum amount of remaining recording time is graphically displayed in a graphic preview mode of operation (column 5, lines 46-49; line 66-column 6, line 4), based upon an amount of physical space that remains available upon said hard-copy printout (column 10, lines 30-37; note that the recording duration can be changed according to the operation setup conditions).

Norris et al. and Morohashi et al. are combinable because they are from the same field of endeavor.

At the time of the invention, it would have been obvious to a person of ordinary skill in the art to have a maximum amount of remaining recording time is graphically displayed in a graphic preview mode of operation, based upon an amount of physical space that remains available upon said hard-copy printout.

The suggestion/motivation for doing so would have been to advance the accuracy and processing time of the system.

Therefore, it would have been obvious to combine Norris et al. with Morohashi et al. to obtain the invention as specified in claim 42.

6. Claim 45 is rejected under 35 U.S.C. 103(a) as being unpatentable over Norris et al. (US Publication Number 2003/0072013 A1) as applied to claim 39 above, and further in view of Soscia (US Patent Number 6,441,921 B1).

(7) regarding claim 45:

Norris et al. disclose all of the subject matter as described as above except for teaching wherein an optical scanner that generates a third data signal from scanning a sheet of hard-copy media, wherein:

at least a portion of image information on said hard-copy media comprises audio information;

at least a portion of said third data signal is representative of said audio information; and

said at least one processing circuit is further configured for one of: (f) to convert said third data signal into a fourth data signal comprising a print job, and to transfer said fourth data signal to said print engine for recording as a hard-copy printout upon a print media, in which at least a portion of said hard-copy printout is representative of said audio information; and (g) to store one of said third data signal and said fourth data signal as a file in a bulk memory device, wherein said file comprises one of: (i)

uncompressed data; (ii) lossless compressed data; (iii) lossy compressed data; (iv) a WAV file, and (v) an MP3 file.

However Sosica discloses wherein an optical scanner that generates a third data signal from scanning a sheet of hard-copy media (column 2, lines 39-42), at least a portion of image information on said hard-copy media comprises audio information (column 3, lines 11-15); at least a portion of said third data signal is representative of said audio information (column 3, lines 16-26; note that the third data signal is considered as the analog sound signal which is converted to sound representative of the sound message); and said at least one processing circuit is further configured to convert said third data signal into a fourth data signal comprising a print job (column 2, lines 61-65), and to transfer said fourth data signal to said print engine for recording as a hard-copy printout upon a print media (column 2, lines 65-67), in which at least a portion of said hard-copy printout is representative of said audio information (column 3, lines 1-6, lines 11-15).

Norris et al. and Soscia are combinable because they are from the same field of endeavor.

At the time of the invention, it would have been obvious to a person of ordinary skill in the art to have an optical scanner that generates a third data signal from scanning a sheet of hard-copy media, at least a portion of image information on said hard-copy media comprises audio information; at least a portion of said third data signal is representative of said audio information; and said at least one processing circuit is further configured to convert said third data signal into a fourth data signal comprising a

print job, and to transfer said fourth data signal to said print engine for recording as a hard-copy printout upon a print media, in which at least a portion of said hard-copy printout is representative of said audio information.

The suggestion/motivation for doing so would have been to have an easy and reliable system that playback sounds that have been recoded on a print medium.

Conclusion

7. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Doi et al. (US Patent Number 6,552,825 B1) disclose a data communication apparatus such as a facsimile apparatus having an automatic telephone message recording function, having a common memory for storing video and audio data that have been received or are to be transmitted.

Petteruti et al. (US Publication Number 2006/0023251 A1) disclose a portable printer that can be attached to a variety of models and types of portable devices, such as PDA, cell phones or other terminal devices.

Rajasekharan et al. (US Publication Number 2003/0089777 A1) disclose a labeling and content authoring scheme that enables seamless labeling, authoring, and playback of authored content, e.g. audio.

8. Any inquiry concerning this communication or earlier communication from the examiner should be directed to Hilina Kassa whose telephone number is (571) 270-1676.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Twyler Lamb could be reached at (571) 272- 7406.

Any response to this action should be mailed to:

Commissioner of Patent and Trademarks

Washington, D.C. 20231

Or faxed to:

(703) 872-9314 (for Technology Center 2600 only)

Hand-delivered responses should be brought to Crystal Park II, 2121 Crystal Drive, Arlington, VA, Sixth Floor (Receptionist).

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Technology Center 2600 Customer Service Office whose telephone number is (703) 306-0377.

Hilina Kassa

July 3, 2007

9.

TWYLER LAMB
SUPERVISORY PATENT EXAMINER